AMENDMENTS TO THE CLAIMS

1. (Previously presented) A memory tag comprising a resonant circuit part, a detector module and an output generator module, the resonant circuit part being operable to generate an output signal in response to a reader signal from a reader, the magnitude of the output signal being dependent on the magnitude of the reader signal, the detector module being responsive to the magnitude of the output signal such that, when the magnitude of the output signal is relatively low, the detector module causes the output generator module to transmit an identifier signal which is configured to cause the reader to increase the magnitude of the reader signal from a first level to a second relatively high level, and when the magnitude of the output signal is relatively high as a result of the tag receiving the second relatively high magnitude reader signal from the reader, the detector module is operable to cause the tag to move to an operating mode.

2. (Previously presented) A memory tag according to claim 1 comprising a memory, wherein the detector module is operable in response to the reader signal being at the second relatively high level, to cause the tag to move to the operating mode by connecting the memory to the resonant circuit part.

3. (Original) A memory tag according to claim 1 comprising a rectifying circuit part responsive to the output signal of the resonant circuit part to generate an output voltage, and wherein the detector module is responsive to the magnitude of the output voltage.

4. (Previously presented) A memory tag according to claim 3 wherein the tag comprises a memory and wherein the detector module is operable to move the tag to an operating mode by connecting the memory to the rectifying circuit part when the output signal is relatively high, and operable to disconnect the memory from the rectifying circuit part when the magnitude of the output signal is relatively low.

5. (Original) A memory tag according to claim 1 wherein the resonant circuit part comprises a switch, wherein when the magnitude of the output signal is relatively low the output generator module is operable to control the switch to transmit the identifier signal, and when the magnitude of the output signal is relatively high, the memory is operable to control the switch.

6. (Original) A memory tag according to claim 1 wherein the output generator module comprises a pseudorandom binary sequence generator to generator an identifier signal comprising a pseudorandum binary sequence.

7. (Original) A memory tag according to claim 1 wherein the resonant circuit part is operable to provide inductive coupling to a reader wherein the reader signal is received via the inductive coupling.

8. (Previously presented) A memory tag comprising a resonant circuit part, a detector module, an output generator module and a memory, the resonant circuit being operable to generate an output signal in response to a reader signal from a reader, the magnitude of the output signal being dependent on the magnitude of the reader signal, the detector module being operable in response to the output signal such that when the magnitude of the output signal received by the memory tag is relatively low, the detector module causes the output generator module to transmit an identifier signal configured to induce the reader to increase the magnitude of the reader signal from a normal finite level to a higher level, and when the magnitude of the output signal is relatively high in response to the magnitude of the reader signal being increased to the higher level, the detector module is operable to connect the memory to the resonant circuit part.

9. (Previously presented) A reader to read a memory tag, the reader being operable to transmit a reader signal to a memory tag, the reader further being operable to receive a signal from a memory tag, the reader:

being operable to transmit the reader signal to the memory tag at a first, relatively low power, and in response to an identifier signal being issued from the memory tag in response to receipt of the reader signal having the first relatively low power, and

being operable to transmit a reader signal to the memory tag at a second, relatively high power whereby the reader is switched from a low power search mode to a high power read mode.

10. (Original) A reader according to claim 9 comprising a resonant circuit part and a signal generator operable to supply a drive signal to the resonant circuit part, the reader

further comprising an amplitude modulator to control the amplitude of the drive signal supplied from the signal generator to the resonant circuit part.

11. (Original) A reader according to claim 9 comprising a output signal identifier module, operable to identify the identifier signal from the memory tag.

12. (Original) A reader according to claim 11 wherein the reader comprises a correlator operable to identify the identifier signal.

13. (Original) A reader according to claim 9 operable to provide inductive coupling to the memory tag wherein the reader signal is transmitted via the inductive coupling.

14. (Previously presented) A reader to read a memory tag, the reader comprising a resonant circuit part, an interrogator, and an identifier signal module, the interrogator module being operable to transmit a reader signal at a first, relatively low power to a memory tag, receive a signal from the memory tag which is generated by the memory tag in response to receipt of the first, relatively low power reader signal, and pass the received signal to the identifier signal module, the identifier signal module being operable to identify the identifier signal and generate an instruction to the interrogator module to generate a reader signal at a second, relatively high power.

15. (Original) A system comprising a memory tag and a reader, the memory tag having a resonant circuit part, a detector module, an output generator module and a memory holding data, the reader comprising a resonant circuit part operable to transmit a reader signal to the memory tag and receive a signal from the memory tag, the reader being operable to transmit a reader signal to the memory tag at a first relatively low power wherein,

the resonant circuit part of the memory tag, in response to the reader signal, generates an output signal having a first, relatively low magnitude,

the detector module is responsive to the first relatively low magnitude of the output signal to cause the output generator module to transmit an identifier signal,

the reader is operable to receive the identifier signal from the memory tag and identify the identifier signal, and generate a reader signal at a second, relatively high power,

the resonant circuit part of the tag is operable to generate an output signal having a second, relatively high magnitude, the detector module being responsive to the output signal having a second, relatively high magnitude to connect the memory to the resonant circuit part, and

the memory tag is operable to send a signal to the reader to transmit the data held in the memory to the reader.

16. (Previously presented) A method of operating a memory tag comprising the steps of detecting a reader signal received from a reader, and, when the magnitude of the reader signal received by the tag is relatively low, transmitting an output identifier signal from the tag to the reader to induce the reader to increase the power of the reader signal, and when the magnitude of the reader signal received by the tag is relatively high as a result of the reader receiving the output identifier signal, moving to an operating mode by using the received reader signal with the relatively high magnitude, to energize the memory tag.

17. (Original) A method according to claim 16 wherein the step of moving to an operating mode comprises permitting operation of a memory of the memory tag.

18. (Previously presented) A method of operating a reader for reading a memory tag comprising:

generating a reader signal normally having a first, relatively low power during a low power search mode,

detecting an identifier signal from a memory tag which is produced by the memory tag in response to receipt of the reader signal having the first relatively low power, and

inducing a high-power read mode by generating, in response to detection of the identifier signal, a reader signal at a second, relatively high power to excite the memory tag into an operating mode wherein data can be transmitted from the memory tag and read by the reader.

19. (Previously presented) A memory tag comprising a resonant circuit part, a detector module and an output generator module, the resonant circuit part being operable to generate a first relatively low magnitude output signal and a second

relatively high magnitude output signal respectively in response to a first reader signal and a second reader signal which are respectively issued from a reader at first and second power levels, the magnitude of the first output signal being variable with the magnitude of the first reader signal which is lower in power than the second reader signal, the detector module being responsive to the relatively low magnitude of the first output signal such that the detector module transmits an identifier signal which is configured to induce the reader to issue the second relatively high power level reader signal, and in response to the second output signal, which is induced by the second relatively high power level reader signal, the detector module is operable to cause the tag to move to an operating mode.

20. (Previously presented) A memory tag according to claim 19 comprising a memory, wherein the detector module is operable to cause the tag to move to an operating mode by connecting the memory to the resonant circuit part.

21. (Previously presented) A memory tag according to claim 19 comprising a rectifying circuit part responsive to the first and second output signals of the resonant circuit part to generate respective output voltages, and wherein the detector module is responsive to the respective magnitudes of the output voltages.

22. (Previously presented) A memory tag according to claim 21 wherein the tag comprises a memory and wherein the detector module is operable to energize the tag into the operating mode by connecting the memory to the rectifying circuit part in response to the second output signal, and operable to disconnect the memory from the rectifying circuit part in response to the first output signal.

23. (Previously presented) A memory tag according to claim 19 wherein the resonant circuit part comprises a switch, wherein in response to the first output signal, the output generator module is operable to control the switch to transmit the identifier signal, and in response to the second output signal, the memory is operable to control the switch.

24. (Previously presented) A memory tag according to claim 19 wherein the output generator module comprises a pseudorandom binary sequence generator to generator an identifier signal comprising a pseudorandum binary sequence.

25. (Previously presented) A memory tag according to claim 19 wherein the resonant circuit part is operable to provide inductive coupling to a reader wherein the reader signal is received via the inductive coupling.

26. (Cancelled)

27. (Previously presented) A method according to claim 18, wherein the step of exciting the memory tag into an operative mode comprises: connecting a memory to a resonant circuit in response to the reader signal being at the second relatively high level.

28. (Previously presented) A method according to claim 27 further comprising:

using a rectifying circuit part responsive to the output signal of the resonant circuit to generate an output voltage, and

using the output voltage to control a detector module.

29. (Previously presented) A method according to claim 18 wherein the tag comprises a memory and a detector module and wherein the detector module is operable to excite the tag into an operating mode by :

connecting the memory to a rectifying circuit when the output signal is relatively high, and

disconnecting the memory from the rectifying circuit part when the magnitude of the output signal is relatively low.